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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/061,120	02/01/2002	Thomas S. Cohen	1615-US	2262

7590

01/15/2003

TERADYNE  
321 Harrison Avenue  
Boston, MA 02118

EXAMINER
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MCCAMEY, ANN M

ART UNIT	PAPER NUMBER
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2833

DATE MAILED: 01/15/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/061,120

Applicant(s)

COHEN ET AL.

Examiner

Ann M McCamey

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-35 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 35 is/are allowed.
- 6) ☒ Claim(s) 1-12, 16, 17, 19-21, 25-29 and 32 is/are rejected.
- 7) ☒ Claim(s) 13-15, 18, 22-24, 30, 31, 33 and 34 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 01 February 2002 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

**Priority under 35 U.S.C. §§ 119 and 120**

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) \_\_\_\_.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). \_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other:

## **DETAILED ACTION**

### ***Specification***

The disclosure is objected to because of the following informalities: "vertical board 110" (page 5, line 3) should be --vertical board 112--.

Appropriate correction is required.

### ***Drawings***

The drawings are objected to as failing to comply with 37 CFR 1.84(p)(5) because they do not include the following reference sign(s) mentioned in the description: contact tails 230 (Page 5, Line 5); slot 221 (Page 6, Line 23); PCB 116 (Page 6, line 31). A proposed drawing correction or corrected drawings are required in reply to the Office action to avoid abandonment of the application. The objection to the drawings will not be held in abeyance.

### ***Claim Objections***

Claim 35 is objected to because of the following informalities: the second occurrences of "(b)" and "(c)" should be --(d)-- and --(e)--, respectively. Appropriate correction is required.

***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in-

(1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effect under this subsection of a national application published under section 122(b) only if the international application designating the United States was published under Article 21(2)(a) of such treaty in the English language; or

(2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that a patent shall not be deemed filed in the United States for the purposes of this subsection based on the filing of an international application filed under the treaty defined in section 351(a).

Claims 1-12, 16, 17, 19-21, 25-29 and 32 are rejected under 35 U.S.C. 102(e) as being anticipated by Ortega et al. (US 6,322,379).

Regarding claim 1, Ortega et al. disclose an electrical connector comprising:

a) a plurality of electrical conductors (Fig. 8A), each electrical conductor having a contact tail 53, an intermediate portion 54, a compliant portion and a contact portion 55;

b) a first housing 160, with the intermediate portion of each of the plurality of electrical conductors attached to the first housing;

c) a second housing 150, with the contact portions of each of the plurality of electrical conductors attached to the second housing; and

d) a compliant coupling between the first housing and the second housing (Fig. 1A).

Regarding claim 2, Ortega et al. disclose each of the compliant portions comprises an elongated segment with bends therein (Fig. 8A).

Regarding claim 3, Ortega et al. disclose each of the complaint portions

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includes a curve.

Regarding claim 4, Ortega et al. disclose each of the compliant portions includes a plurality of curves.

Regarding claim 5, Ortega et al. disclose each of the complaint portions includes two curves, curving in opposite directions.

Regarding claim 6, Ortega et al. disclose the first housing is an insulative housing.

Regarding claim 7, Ortega et al. disclose the second housing has gathering features formed therein.

Regarding claim 8, Ortega et al. disclose wherein the gathering feature comprises at least one tapered surface.

Regarding claim 9, Ortega et al. disclose the second housing has a plurality of side walls bounding a mating area and the contact portions of each of the plurality of electrical conductors is disposed within the mating area.

Regarding claim 10, Ortega et al. disclose the contact portions are disposed in the mating area in a rectangular array having rows and columns and the electrical connector further comprises a plurality of conducting plates disposed in parallel, each plate being disposed between adjacent rows of contact portions.

Regarding claim 11, Ortega et al. disclose the second housing is an insulator.

Regarding claim 12, Ortega et al. disclose portions of the plurality of electrical conductors are separate insulative portions to form subassemblies.

Regarding claim 16, Ortega et al. disclose the complaint coupling comprises at least one recess in the first housing with a lip extending into the recess and a tab projecting from the second housing, with the tab engaging the lip.

Regarding claim 17, Ortega et al. disclose the complaint coupling further comprises a stop spaced apart from the tab.

Regarding claim 19, Ortega et al. disclose an electrical connector comprising:

a) a plurality of subassemblies disposed side-by side, each subassembly comprising:

i) a plurality of electrical conductors (Fig. 8A), each electrical conductor having a contact tail 53, an intermediate portion 54, a compliant portion and a contact portion 53;

ii) an insulative portion (Fig. 8B) encapsulating the intermediate portions of the electrical conductors with the compliant portions extending from the insulative portion;

b) a cap 150 receiving the contact portions of the plurality of subassemblies and holding the contact portions, with the compliant portions extending from the insulative portion. whereby the cap may move relative to the insulative portions of the subassemblies.

Regarding claim 20, Ortega et al. disclose each of the subassemblies holds the intermediate portions in a plane.

Regarding claim 21, Ortega et al. disclose a shield member attached to the insulative portion parallel to the plane of the intermediate portions.

Regarding claim 25, Ortega et al. disclose the compliant portions comprises an elongated segment with bends formed therein.

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Regarding claim 26, Ortega et al. disclose the bends comprise smooth curves.

Regarding claim 27, Ortega et al. disclose the bends comprise two smooth curves, curving in opposite directions.

Regarding claim 28, Ortega et al. disclose a housing receiving at least a portion of the insulative portions of the plurality of subassemblies.

Regarding claim 29, Ortega et al. disclose a compliant coupling between the housing and the cap.

Regarding claim 32, Ortega et al. disclose the compliant coupling comprises a tab engaged under a lip.

***Allowable Subject Matter***

Claim 35 is allowed.

Claims 13-15, 18, 22-24, 30, 31, 33 and 34 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

The following is a statement of reasons for the indication of allowable subject matter: claims 13 and 22 recite the limitation of the plurality of compliant portions having distal ends extending from the intermediate portion of the shield/plate. Claims 18, 30 and 31 recite a means for allowing motion between the housing and the cap. Claim 33 and 35 include the limitation of a second plurality of subassemblies/wafers with features similar to those of the first plurality of subassemblies/wafers. These

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limitations, in combination with the other limitations of the claims, are neither anticipated by nor obvious over the art of record.

### ***Conclusion***

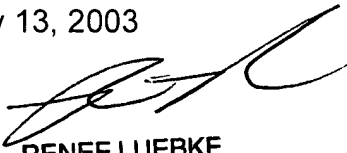
The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Billman et al. (US 6,343,955) disclose a connector with a second housing/cap.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ann M McCamey whose telephone number is (703) 305-3422. The examiner can normally be reached on M-F 9-5:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Paula A. Bradley can be reached on (703) 308-2319. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 872-9318 for regular communications and (703) 872-9319 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0956.

AMM  
January 13, 2003



RENEE LUEBKE  
PRIMARY EXAMINER